

Customer No.: 23494

Attorney Docket No. : P146-US

IN THE SPECIFICATION

1. Please amend paragraph [0027] as follows:

[0027] Turning to the drawings, FIG. 1 illustrates a perspective view of a portion of an exemplary spatial light modulator. In its basic configuration, spatial light modulator 100 comprises micromirror array 106 formed on glass substrate 102 that is transmissive to visible light. The micromirrors are individually deflectable by an array of electrodes and circuitry 108 formed on semiconductor substrate 104 disposed proximate to the glass substrate. In general, the spatial light modulator comprises thousands or millions of individually deflectable micromirrors. The micromirror may be of any suitable configuration, such as that shown in FIG. 2. As shown in FIG. 2, a mirror plate 110 is held on glass substrate 102 and connected to the glass substrate via posts 112. Mirror plate 110 is attached to the hinge 114 such that the mirror plate is operable to rotate on the substrate. There are many other alternatives to the spatial light modulator in FIG. 1 and micromirror in FIG. 2. For example, the micromirror array of the spatial light modulator can be formed on a semiconductor substrate (e.g. substrate 104) having thereon an array of electrodes and circuitry (with or without a protection glass bonded thereto). The micromirror of FIGS. 1 and 2 are fabricated such that the hinge is underneath the mirror plate and hidden from the incident light traveling through the glass substrate. This configuration benefits the display performance. Specifically, the contrast ratio of the displayed images can be improved from removal of the light scattering by the hinge. Alternatively, a micromirror may have a hinge and mirror plate, wherein the hinge is exposed to the incident light. The mirror plate can take any desired shapes in addition to four sided shape as shown in the figures. The mirror plate can be attached to the hinge such that the rotation of the mirror plate is asymmetrical or symmetrical. Specifically, the mirror plate can be attached to the hinge at an attachment location that is not at the center of the mirror plate such that the hinge is parallel to but offset to a diagonal of the mirror plate when viewed from above. For improving the performance of the micromirror, other structures, such as a stopping mechanism (e.g. stopper 105 in FIG. 2) for limiting the rotation of the mirror plate can be provided.

2. Please amend paragraph [0042] as follows:

[0042] In general, the spatial light modulator is packaged before delivery to customers. An exemplary spatial light modulator package is illustrated in FIG. 5. As shown in the figure,

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spatial light modulator 100 is attached to package substrate 126 of package 120. The package substrate may take any desired shape and form and may comprise any suitable material. In this particular example, the package substrate is a ceramic and has a cavity in which the microelectro-mechanical device can be disposed. A separate lubricant container 128 (other than the lubricant container attached to the substrate having the micromirrors) can be provided and placed on the package substrate at a location proximate to the spatial light modulator. The container contains a lubricant that evaporates from the container to the surface of the micromirrors of the spatial light modulator for lubricating the surface. In order to seal the package, package cover 122 is provided and sealing material 124 is disposed between the package substrate and the package cover for bonding the package substrate and the package cover. The sealing material can be deposited on the top surface of the package substrate or on the bottom surface of the package cover, or alternatively, on both.